

By cross-pollinating career skills with the ideologies of “hacking,” academics can seed creative avenues of research

 blogs.lse.ac.uk/impactofsocialsciences/2013/06/26/hack4ac-event/

6/26/2013

Open Access journals PeerJ and eLife have joined together to promote a day of open licensing awareness in academia through a hackday event on 6th July called “Hack4ac”. PeerJ co-founder [Jason Hoyt](#) outlines why “hacking” is beneficial to academic creativity, quality research and wider dissemination of research findings. It is hoped that as more hacking events take place the benefits of programming and OA content in the sciences and humanities will become more widely known.



One of the surprising ironies of the explosive growth of the Web over the past couple of decades is that academic literature, to many, actually seems more difficult to access. This contradiction has arisen because a majority of academic literature is still published in subscription-based journals where the reader, often a university library, pays a substantial fee. Many feel that since taxpayers already pay for the majority of academic research that they shouldn't have to pay yet again to read the results of what they have funded. Over the past decade, this has led to a new type of publishing model known as “Open Access.” Open access journals publish their academic literature without restriction to the content. This means that you can freely download and reuse the findings. Open access publishing has grown to represent more than 10% of academic literature over the past 10 years and it continues to accelerate.

It isn't all pretty, however. Many in the academic world still do not publish their research openly in such Open Access journals and are unaware of its benefits to themselves and to society. Additionally, some publishers have defined their own versions of Open Access, which are not truly meeting the spirit of what it means to be “OA.” This is why two Open Access publishers, [PeerJ](#) and [eLife](#) have joined together to promote a day of open licensing awareness in academia through a hackday event called “Hack4ac.” Joining PeerJ and eLife in co-sponsoring the event is another OA publisher, [PLOS](#), as well as [Digital Science](#), and Amazon Web Services. The event is being held at SkillsMatter in London on Saturday, July 6th and tickets are [still available](#) to both academics and interested programmers.

Why should academics be interested in “hacking?”

Hacking is really about innovation and thinking outside the box. It's about combining different materials together. This is of course exactly what academic research is about, though often through more formal methodologies. By cross-pollinating career skills with the ideologies of “hacking,” academics can potentially seed new creative avenues of research. Hack4ac therefore is not just for hardened programmers, but also to invite academics in to advance their research.

There are also some very practical incentives for academics to join a hack event. Hack4ac is specifically a day of programming, though hacking need not necessarily be about programming (e.g. you can hack machinery and even abstract ideas such as public policy). Programming is becoming more and more of an important and even essential tool to every field of research. It is no longer just the domain of computer scientists, but being used in biology, medicine, statistics, economics, and even the humanities. Every academic can benefit from knowing the direction that programming is heading and what is possible from it, even if they do not have the skills or time to necessarily program on a day-to-day basis. Hack events are also most successful when there is diversity. It isn't just about programming, as teams benefit from non-programmers who bring different experiences and business skills to the table.

What is CC-BY and why is it important?

The Hack4ac event aims to utilize content and spread awareness of CC-BY licensing for academic research findings, but what is CC-BY? For many years, academics have signed away their copyright in order to publish their findings. In the strictest sense then, the scientists would have to pay to get a copy of their own research findings! This was obviously counter to what was desired by many, as well as with many other creative works. A new type of licensing was needed, one that could possibly allow for attribution to still occur, but allow the user to freely take and use the content. The Creative Commons licensing was developed out of this need, and “CC-BY” is one of several versions of licensing. Open Access publishers allow academics to keep their copyright, but also license the findings to anyone. With CC-BY you don’t even need to ask permission, you can freely download and use the content as long as you acknowledge the source in any new works that derive from it.

For science and the humanities then, CC-BY licensing often equates to the widest distribution possible for research findings. And it means tax payers do not need to pay yet again to read the research that they funded. However, as mentioned above, there is still confusion about CC-BY licensing, which this hack event aims to resolve. Because of the different types of “CC” licenses that are available, some publishers have chosen a more restrictive type of CC licensing that is not true OA. For instance, some CC licenses do not allow derivatives or commercial application of any findings. Often these are presented as optimal to the academic, when in fact they are not. Choosing such licenses greatly restricts how others can benefit from research findings. By using CC-BY only content at the Hack4ac event it is hoped that the benefits of the less restrictive copyright licensing CC-BY or CC-0 can be made more clear to the public and to academics.

While the physics, mathematics, and biology communities have seen the most growth over the last decade, the humanities and social sciences have been slower to take up the Open Access publishing model. While part of the reason has to do with the different levels of funding available to the sciences versus humanities, tradition as well has played a large part in the slower uptake. That tradition is evolving, however, and it is hoped that as more hacking events take place that the benefits of programming and OA content in the humanities will become more widely known. And perhaps such grassroots events will spur new funding policies that ultimately help the humanities make Open Access more attainable, just as such funding has helped OA in the sciences.

Even if you cannot make it to this particular event we do hope that you will spread awareness about the societal benefits of Open Access and CC-BY licensing in your academic community.

Note: This article gives the views of the author, and not the position of the Impact of Social Science blog, nor of the London School of Economics.

About the Author

Jason Hoyt is co-founder and CEO of PeerJ, a new open access publisher funded by Tim O’Reilly, noted open source visionary, and co-founded alongside Peter Binfield, former publisher of the world’s largest academic journal, PLOS ONE. Jason holds a PhD in Genetics from Stanford University and previously served as VP of R&D at Mendeley before founding PeerJ.

- Copyright © The Author (or The Authors) - Unless otherwise stated, this work is licensed under a Creative Commons Attribution Unported 3.0 License.